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WHICH POPULATION?

All figures and tables appear at the end.

The release of data from the 1996 Australian Census of Population and Housing, now underway, will trigger a new cycle of analysis and research on population trends and the social, demographic and economic characteristics of local and regional populations. The Census provides the most comprehensive source of data on the size and composition of the population and, as a result, is used widely in planning the provision of services and facilities. However, the Census, like all data sources, has its pitfalls. Care is needed, even at the most basic level of selecting the appropriate measure of population, for the task at hand. The Census provides the basis for three quite distinct measures of population and in many parts of Australia these give very different pictures, not only of the size of the population, but also of its composition.

This paper outlines the major differences between these measures and examines some of the difficulties these present for planners and policy makers working with data for small geographic regions such as Local Government Areas (LGAs), Statistical Local Areas (SLAB) or Census Collection Districts (CDs). Results from the 1996 Census were only just becoming available at the time of writing so the analysis presented here is based largely on information from 1991. Although the statistics themselves are now somewhat dated, the analysis serves to focus attention on the need to discriminate between the various measures of population that are available and the traps they hold for the unwary.

Measuring the population

The quinquennial Australian Census of Population and Housing provides the basis for three related, but conceptually quite distinct, measures of population: *census counts - place of enumeration, census counts - place of usual residence* and the *estimated resident population.* These are commonly abbreviated to census counts, usual residents and ERP respectively.

CENSUS COUNTS

The Australian Census is conducted on a de facto basis, i.e. people are enumerated where they happen to be on Census night, irrespective of where they usually live. Census counts are a measure of this population as enumerated. As such, the count for any given area comprises two distinct components: the population *counted at home,* and visitors from overseas or from other parts of Australia who happened to be in the area on Census night. On the other hand, people who usually live in the area but were elsewhere at the time of the Census (*residents temporarily absent*) are not included in the count. It is readily apparent that residents temporarily absent from one area are visitors to another, and *vice versa*. Because the Census is confined to Australia, however, information is available on the number of overseas visitors in the country on Census night, but not on the number of usual residents temporarily overseas.

USUAL RESIDENTS

Census counts are converted to a usual residence basis by statistically returning to their place of usual residence people who were enumerated away from home. Thus, compared with census counts, usual residence data exclude visitors from outside the area in question, but include usual residents who were temporarily absent (except those temporarily overseas). The facility to return people to their place of usual residence is provided by questions on the Census form which capture the precise usual address of people who were away from home on Census night. An individual's usual residence is defined as the address at which the person has lived or intends to live for a total of six months or more during the year in which the Census is taken (ABS 1991).

ESTIMATED RESIDENT POPULATION

The third measure, the ERP, is a synthetically derived estimate, made by adding to the count of usual residents an allowance for under-enumeration at the Census and an estimate of the number of usual

residents temporarily overseas. Further modifications are also made to adjust the data from the Census date of August 6th to 30th June. The ERP is updated quarterly at the national and state levels, and annually at the SLA level and represents the Australian Bureau of Statistics (ABS) official e stimate of the population of Australia. As such, it is used for a number of purposes including financial disbursements to the states and local government, defining electoral boundaries, and as the basis for population projections prepared by ABS, state and local authorities.

Differences between the measures

The variations in the way these three measures are calculated result in quite different estimates of population numbers. At the national level, the variance is relatively small. The 1996 Census count of 17,892,423 was just 0.8% above the figure for usual residents (17,752,829), the difference of 139,594 representing the number of visitors from overseas who are excluded from the count of usual residents. The (preliminary) ERP for June 1996 was higher again at 18,311,500 persons (3.1% above the usual residents figure) reflecting the adjustments for under-enumeration, Australians temporarily overseas and the shift in reference date noted above.

It is at the local level that the variations between the three figures are most pronounced. Under-enumeration and residents temporarily overseas are again important in accounting for differences between usual residents and the ERP but it is the number of people counted away from home on Census night − visitors or temporary movers − which makes the crucial difference between the Census count and the number of usual residents.

At the time of the 1991 Census there were 832 LGAs in Australia. For the purposes of analysing spatial variations we have accorded four additional regions LGA status: these are the ACT and the unincorporated parts of New South Wales, South Australia and the Northern Territory. Table 1 sets out the extent of the differences between the three measures of population across these 836 'LGAs', using the usual residents figure as the benchmark. Turning first to the left hand panel, Table 1 reveals that there were 491 LGAs in which the 1991 Census count exceeded the number of usual residents and 345 in which the number of usual residents was the greater. Thus, temporary movements of visitors do not simply balance out over space: they effect a substantial, if ephemeral, shift in the pattern of human settlement. It is also notable that the magnitude of the variations is much larger where the discrepancies are positive, indicating that while visitors are drawn from widely across the continent, they tend to congregate in a more limited number of locations.

In many LGAs, the variation between the Census count and the number of usual residents was relatively small − in five cases out of six it was under 5%. On the other hand, there were 71 LGAs in which the count exceeded the number of usual residents by 10% or more, and in two areas, Snowy River Shire in the centre of the New South Wales snowfields, and Shark Bay Shire, a popular tourist destination on the remote, central coast of Western Australia, the count was more than double the usual residents figure. Even where the total variation is small, however, data sources may give quite different pictures of an area's population composition. This is because the conversion from census counts to a usual residence base involves compensating adjustments − the removal of visitors to the area and the return of residents temporarily absent. Thus, simple comparison of the census count with the number of usual residents does not accurately indicate either the magnitude of visitor movements or their effect on population composition. We pursue this point further below.

Differences between the ERP and the number of usual residents (the right hand panel of Table 1) were somewhat larger than those between usual residents and the census counts, but displayed fewer extremes. In more than 30% of LGAs the ERP was 5% or more above the count of usual residents but in only two cases (Westonia Shire and Sandstone Shire in Western Australia) was it more than 10% higher. Conversely, there was one LGA (Croydon Shire in Queensland) in which the ERP was less than the number of usual residents. This narrow range of variation principally reflects the fact that the Census post-enumeration survey only captures broad regional differences in under-enumeration.

Since the largest differences tend to occur between census counts and usual residence data, it is important to understand the nature of the temporary mobility that underpins these variations. The following sections examine the patterns of this movement and the forms that it takes, and describe the characteristics of temporary movers. We then analyse the effects of this movement on population composition at the local level, as revealed by different Census measures.

Patterns of temporary mobility

The Census is deliberately scheduled to minimise the likelihood of people being away from home. Indeed, the decision to shift the Census from the traditional date of 30 June to 6 August after 1986 was taken to avoid coincidence with school holidays after state and territory education departments converted to a four term school year (ABS, 1991, 34). Nevertheless, the incidence of temporary mobility has been steadily increasing. Almost one million people (5.4% of the population) were enumerated away from their usual place of residence on the night of the 1996 Census, an increase of almost 35% over 1986 (Table 2).

Temporary absences from home can invoke relatively short distances and durations, such as an overnight stay at a neighbour's house, or much longer displacements, such as an overseas holiday. In the context of data analysis for small areas, local visits, such as those to another dwelling within a person's home SLA, are of little significance because the individual will appear in the same SLA in both the Census count and this type accounted for only 13% of all absences from home at the 1996 Census. Three-quarters of those identified as visitors were usual residents of Australia counted outside their SLA of usual residence and a further 14% were visitors from overseas. It is the temporary movements of these two groups that generate the differences in the size and composition of the population of small areas measured according to usual residence, compared with the census counts.

Table 3 classifies LGAs according to the representation of visitors in the Census count. It is immediately apparent that the impact of visitors is larger than was suggested by Table 1. This is partly because the two tables use different denominators, but it also underlines the fact, noted above, that comparison of census counts and usual residence data masks the reciprocal nature of many visitor movements. In more than half of the 836 LGAs, visitors comprised less than 5% of the population. However, there were 115 areas in which they made up 10% or more, and 36 where they accounted for more than 20%. In the two extreme cases (Snowy River and Shark Bay) visitors made up in excess of half the population count.

Table 4 lists the 36 LGAs in which visitors comprised 20% or more of the Census count. In some instances the actual number of visitors was quite small. Four of the 36 LGAs hosted less than 100 visitors on Census night and eight had less than 200 visitors. On the other hand, in both Cairns and Snowy River more than 10,000 of the people enumerated were away from home.

Visitors were prominent in many coastal areas and in the centres of the large cities but many of the heaviest concentrations were in inland and remote locations (Figure 1). This redistribution of population through temporary mobility shows some similarities to the pattern of permanent migration within Australia. Many of the coastal locations that attracted visitors also recorded substantial gains of permanent migrants. However, there were also significant differences between the two types of movement. In contrast to the inflow of temporary movers, the pattern of permanent migration across inland Australia over the past two decades has been one of persistent net migration losses (Bell 1995). Similarly, while the central cities attracted visitors, most inner urban areas have suffered sub through out-migration, although at a diminishing rate.

These contrasts suggest that while there may be some linkages between permanent and temporary migration (e.g. in coastal locations), elsewhere the two forms of movement serve different purposes and respond to distinctive sets of forces. They may also perform complementary roles, as anticipated in Zelinsky's (1971) influential Hypothesis of the mobility transition. One example of this is found in the development of long distance commuting (LDC) based on fly-in/fly-out operations as a substitute for the establishment of permanent mining towns in remote areas (Houghton 1993).

Types of temporary movement

The Census provides no data on the reasons people are away from home, so it is not possible to derive a definitive classification of the various types of temporary movement. However, it is clear that temporary mobility involves a range of different groups and occurs for a wide variety of motives. These include visits to friends and relatives, holiday-making, business trips, attendance at meetings and conferences, seasonal work such as fruit-picking and shearing, cyclic movements of workers to remote mining locations and stays in hospital, nursing homes and other institutions.

Essentially, these movements can be divided into two main types: those that involve some form of consumption at the destination, and those that aim to contribute to production. The former are generally pleasure-oriented (although visits to hospital − consumption of health care − might also be included), while the latter are mainly work-related. While most overnight trips probably involve

some element of both production and consumption, this distinction does serve to focus attention on the differing impacts which temporary movers may have on their destinations.

It is difficult to determine the relative significance of the various types of movement listed above, even at the national level. At the local level, surveys of domestic and international travel (BTR 1995a, 1995b) provide useful data for tourist destinations, but other areas appear to attract a mix of visitor types. One recent analysis (Bell & Ward in press) suggested that four types of area with high concentrations of temporary movers could be recognised. Based on their economic functions and the origins of their visitors. These were:

- the central cities, which attract a mix of tourists and business travellers, both domestic and from overseas, and also house temporary movers in institutional accommodation such as hospitals, student colleges and nurses quarters;
- tourist destinations, situated mainly in coastal areas. These, in turn, could be differentiated into three main types, based on the predominant origin of their clientele (same state, interstate or overseas);
- areas attracting temporary and seasonal labour, some in mining, others in primary production, located mainly in inland and remote areas; and
- 'stopover' locations for itinerant tourists, many of which also provide seasonal work.

What complicates the analysis of short term mobility compared with permanent migration is that the various forms of temporary movement identified above are often repetitive, are of varying duration and follow different seasonal cycles both in space and time. The Census simply provides a snapshot of the distribution of population at one point in the year and this is almost certainly not a representative sample. While some forms of temporary movement, winter-sports holiday-making, for example, are at their peak at Census time, others, such as vacation trips among families with children, are low. Thus, while an understanding of temporary movements is important for interpreting Census data, the Census in turn only provides a small window into temporary mobility.

Characteristics of temporary movers

If the characteristics of temporary movers were the same as those of the populations at their destinations they would be of only passing interest. In practice, however, temporary mobility, like permanent migration, is highly selective of particular population groups (Bell & Ward in press). Compared with those enumerated at their usual residence on the night of the 1991 Census, people counted away from home:

- included a substantial representation of retirees (aged 55 and over) and of young adults aged 15-34, and correspondingly fewer children and adults of middle age;
- were more likely to be separated, divorced or widowed;
- were less likely to be in the labour force;
- included a substantial representation of people working in mining and agriculture;
- included significant numbers employed in management and the professions and fewer clerical, sales and service workers; and **a** were marginally more likely to be on very high or very low incomes.

While the immediate image of 'visitors' is one of tourists staying in hotels or motels, it is also notable that only 14% of people away from home on Census night were located in this type of accommodation. Fully 71% were enumerated in private dwellings, 7% in hospitals and homes for the aged, and 8% in other forms of non-private accommodation.

Census counts and usual residents: Comparing characteristics

At the local level the selective nature of temporary migration results in marked differences between the characteristics of the population as enumerated on Census night and that apparent from the data on usual residents. Tables 5, 6 and 7 illustrate the extent of these differences in a sample of LGAs. The selected locations include examples from each of the four main types of temporary resident destinations identified above. Snowy River Shire in New South Wales, Shark Bay Shire in Western Australia and Douglas Shire in Queensland all are tourist centres but are widely spaced and each offers a somewhat different tourist experience; Cue Shire in Western Australia is a focus of seasonal

employment, especially in the pastoral and mining industries; Queensland's Diamantina Shire is a stopover location that also offers temporary work, while Sydney City epitomises the central city locations that are also attractive to visitors.

Table 5 shows that census counts and usual residence data give quite different pictures of the age profile of the population in these LGAs. In Snowy River the largest difference between the two measures was in the 20-39 age group which is indicative of the prominence of young adults among winter-sports holiday makers. This same age group was also the most prominent in Western Australia's Cue Shire. Here, however, temporary employment, rather than recreation, probably accounts for the substantial temporary presence of young adults. In contrast, in the north Queensland resort area of Douglas Shire, differences between census counts and usual residence figures were largest at older ages, especially among those aged 60 and over, indicating a visitor profile markedly different from that found in the snow country. Shark Bay in Western Australia displays a similar profile, again with high levels of visitation among older people. Indeed visitors to Shark Bay on Census night in the 60 plus age group outnumbered usual residents by almost 4 to 1. This profile probably reflects Shark Bay's isolated location and the fact that the extended travel time needed to visit such a remote region is less of an impediment for retired people. Whatever its cause, this visitor profile clearly underlines the need for caution in the choice of data for planning. Census counts suggest that more than a quarter of Shark Bay's population were aged 60 or over whereas only 16% of usual residents were in this age group.

While the ratio between census counts and usual residents is a useful index, absolute numbers are also important. The ratios for Queensland's Diamantina Shire suggest a bias towards older visitors similar to that found in Shark Bay and Douglas but the numbers involved were very small. The largest absolute difference between census counts and usual residents actually occurred at ages 20-59. In this case, the pattern of visitation can be attributed partly to seasonal employment in the pastoral industry but it also reflects 'stopovers' among four wheel drive tourists in the township of Birdsville, situated at the northern end of the famous Birdsville Track, and at the eastern end of the French Line Track across the Simpson desert.

Comparison of census counts and usual residence data for Sydney City reveals a somewhat different visitor profile. While older visitor numbers were again high, the largest variation occurred in the under 19 and 40 to 59 age groups. This suggests high rates of visitation by young adults and family groups, and reflects Sydney's role as a gateway for overseas and domestic visitors and for temporary internal movement associated with a range of activities including tourism, business, health and education.

While comparison of age distributions is straightforward, the interpretation of labour force characteristics is much more problematic. This is because variables such as labour force status, occupation and industry, whether reported on a census count or usual residence basis, refer to respondents' employment in the week prior to the Census and may or may not, be connected to their status as temporary movers. For some types of visitors, such as seasonal workers, business travellers, or those engaged in LDC, labour force - characteristics provide a useful indicator of the type of activity occurring in a region. On the other hand, the occupations of holiday makers are less significant. The problem is that Census data provide no means of distinguishing between these groups. Yet, as in the case of age, usual residence data give quite a different picture from census counts. As can be seen from Table 6, in Douglas, Diamantina and Shark Bay, census counts indicate much lower rates of employment than is actually the case among usual residents, and correspondingly higher proportions outside the labour force.

Conversely, in Snowy River, Sydney and Cue, Census data understate the incidence of unemployment and inflate the proportions apparently in work. In the case of Snowy River, the high proportion employed probably reflects the presence of relatively well-heeled, and therefore employed, winter-sports enthusiasts. Business visitors would exert a similar effect, raising the employment rate in Sydney In Cue Shire, on the other hand, the higher proportion employed indicated by the Census is more likely the product of a seasonal workforce.

Income data are widely used to identify population groups suffering locational disadvantage. Here again, comparison of census counts and usual residence data points to the need for caution in choosing the appropriate measure of population. Table 7 shows that census counts consistently understated the proportion of low income earners in each of the six selected LGAs Conversely, high income earners were significantly over-represented. In Sydney, for example, the number of usual residents on annual incomes of $50,000 or more (459) was only one quarter of the figure indicated by the census count (1661). In Snowy River the difference was even more striking: the census count of high income earners (1413) was an order of magnitude above the number of high earners usually resident (153). Analysis of the data for Douglas and Shark Bay reveals similar contrasts. Thus, while one measure of population

suggests relative affluence, the other points to comparative disadvantage. If data analysis has any influence on policies to alleviate poverty, initial data selection is clearly of paramount importance.

Which population?

The foregoing analysis reveals that the three measures of population − census counts, usual residents and the ERP − provide quite different pictures of the population in many LGAs, not only in regard to absolute numbers, but also in terms of their social, demographic and economic composition. These disparities send important signals to analysts of the need for caution when examining and using Census data.

Each of the three populations has a different conceptual foundation and none can be identified, a priori, as the 'correct' one to use in all circumstances. In practice, the choice of population will be strongly influenced by differences in the range of data available from the three measures and the level of disaggregation at which these data are provided. Table 8 summarises the key differences. For planning at the local level, one crucial variation lies in the level of spatial disaggregation which is possible. At the sub-SLA level, only census counts are available. Although the Census seeks the precise usual address of people counted away from home, this information is only coded to SLA and postcode level, not to CDs, the basic building block of Census geography. Hence, neither usual residence data nor the ERP are available below SLA level.

The range of population characteristics available on the three measures also differs. For example, it is not possible to tabulate dwelling, households or family attributes on a usual residence basis. This is less of a limitation than it might appear because the census counts for these variables are effectively based on usual residence criteria (ABS 1991). However, it does mean that information on the household and family characteristics of visitors themselves are not available. The characteristics available for ERP at SLA level are even more limited, being confined solely to age and sex. Offsetting this limitation is that at SLA level the ERP is updated annually whereas census counts and usual residence data become available only once every five years.

At the local level, contemporary practice overwhelmingly favours census counts as the preferred measure for demographic analysis. This is partly because of the finer spatial and compositional detail available on an 'as counted' basis, but it also reflects the fact that counts are invariably the first Census data to be released. Planners are usually concerned with the characteristics of the population, households and dwellings as well as the overall numbers of people. Hence, planning studies often employ data based on census counts. In using these data however, it is essential that analysts be aware that the composition of the population may be skewed by the characteristics of non-residents. Using age, labour force and income as examples, this paper has highlighted the strikingly different population profiles that can emerge, depending on which measure of population is chosen.

This paper has also demonstrated that census counts are furthest removed, both conceptually and numerically, from the official measure of population - the ERP. This, in turn, creates difficulties in reconciling local demographic analysis with population projections which are invariably ERP-based and used universally for regional and local planning purposes. It also draws into question the use of the ERP as the basis for intergovernmental revenue-sharing.

What are ideally required, both for revenue-sharing and for planning the provision of services, are estimates of the 'service population' − the population which actually creates the effective demand for services and facilities. This is clearly recognised both by local authorities and by the Grants Commissions which have been prominent in lobbying ABS to develop such estimates (ABS 1996a). ABS have recently reviewed the issues involved and it is clear that there is no straightforward solution (ABS 1996b). Estimates of the peak, or maximum, population are clearly needed to ensure that social and economic infrastructure are adequate, but seasonal variations must also be taken into account if services are to be provided efficiently. For some services, the characteristics of residents and visitors, their duration of stay and purpose of visit may also be important. Optimally, such estimates would provide an annual profile for each locality showing how the magnitude and composition of the resident and visitor populations varied over the course of a year (Bell & Ward, in press).

While none of the three measures examined here fulfil this requirement, census counts perhaps come closest since they at least provide data at the small area level, and include a component of temporary movers. In the absence of a new, purpose-designed collection, the most promising avenue for the development of service population estimates seems likely to involve an eclectic approach, combining Census data with information from a variety of other

sources (Bell & Ward, in press). Some data from other national collections, such as surveys of domestic tourism (BTR), or agencies such as Centrelink (for data on seasonal workers) may provide useful input (ABS 1991b) but ultimately the construction of such data sets will also need to tap more localised data sources. As with Census data, analysts will need to have a clear understanding of the scope and limitations of such data sources if the information is to be used both sensibly and effectively. Pending the development of improved data sets, planners utilising Census information to examine trends in the growth and composition of local populations would be well advised to carefully consider, and compare, all three of the Census-based measures that are available.

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TABLE I: CENSUS COUNTS AND ERP COMPARED WITH NUMBER OF USUAL RESIDENTS LGAs 1991

Percentage difference	Difference between Census counts and usual residents[1]		Difference between ERP and usual residents[2]	
	Number of LGAs	Per cent	Number of LGAs	Per cent
100 or more	2	0.2	0	0.0
50 to 99.9	6	0.7	0	0.0
20 to 49.9	27	3.2	0	0.0
10 to 19.9	36	4.3	2	0.2
5 to 9.9	58	6.9	248	29.7
0 to 4.9	362	43.3	585	70.0
0 to-4.9	340	40.7	1	0.1
-5 to -9.9	5	0.6	0	0.0
Total	836	100.0	836	100.0

Source: Australian Bureau of Statistics, 1991 Census (unpublished data)
Note 1 : Census counts minus usual residents as per cent of usual residents
Note 2: Estimated resident population minus usual residents as per cent of usual residents

TABLE 2: PEOPLE COUNTED AWAY FROM HOME 1976-1996

Census date	Number	Per cent of population
30 June 1976	688122	5.1
30 June 1981	855229	5.9
30 June 1986	721892	4.6
6 August 1991	817421	4.9
6 August 1996	972780	5.4

TABLE 3: LOCAL GOVERNMENT AREAS BY PROPORTION OF TEMPORARY MOVERS 1991

Class interval	Number of LGAs	Per cent of total
0-4.9%	452	54.
5-9.9%	269	32.2
10-19.9%	79	9.4
20-49.9%	34	4.1
50%+	2	0.2
Total	836	100.0

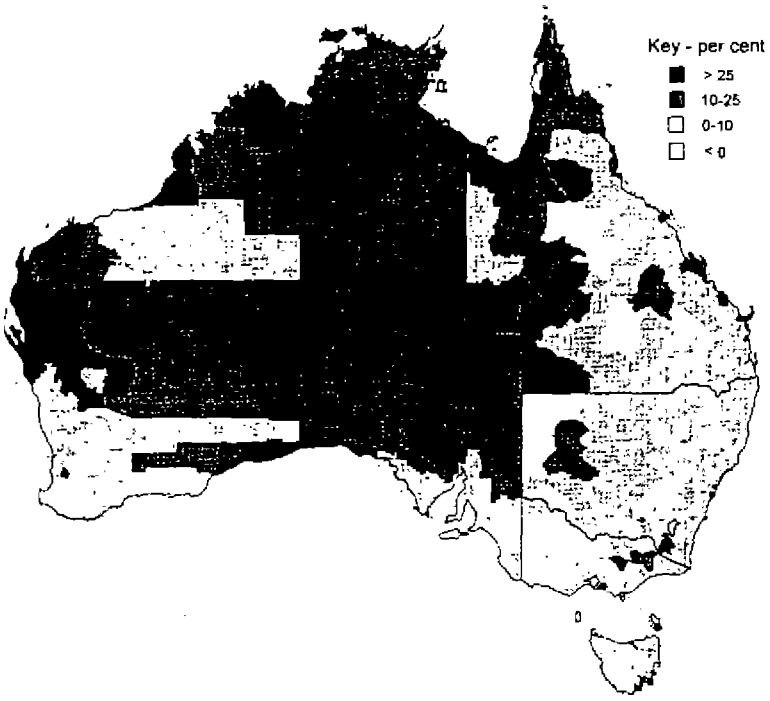
Source: Australian Bureau of Statistics, 1991 Census (unpublished data)

TABLE 4: LOCAL GOVERNMENT AREAS WHERE MORE THAN 10% OF PERSONS ENUMERATED WERE VISITORS

LGA	State	Visitors	Census count	Visitors as per cent of census count
Snowy River (S)	NSW	10810	17077	63.3
Shark Bay (S)	WA	932	1623	57.4
Bright (S)	Vic	5904	11846	49.8
Sandstone (S)	WA	168	353	47.6
Yalgoo (S)	WA	288	678	423
Exmouth (S)	WA	1621	3820	42.4
Unincorporated	NSW	1781	4227	42.1
Cue (S)	WA	318	859	37.0
Douglas (S)	Qld	4583	12429	36.9
Bulloo (S)	Qld	282	800	35.3
Mansfield (S)	Vic	2981	8465	35.2
Diamantina (S)	Qld	112	334	33.5
Broome (S)	WA	3735	11151	33.5
Carnarvon (S)	WA	3027	906]	33.4
Murchison (S)	WA	61	183	33.3
Sydney (C)	NSW	4503	13528	33.3
Etheridge (S)	Qld	448	1378	32.5
Isisford (S)	Qld	133	443	30.0
Northampton (S)	WA	1064	3551	30.0
Coomalie (CGC)	NT	350	1233	28.4
Whitsunday (S)	Qld	4070	15223	26.7
Adelaide (C)	SA	3969	14863	26.7
Wyndham (S)	WA	2001	7716	25.9
Upper Gascoyne (S)	WA	88	342	25.7
Jabiru (T)	NT	440	1741	25.3
Coober Pedy (DC)	SA	712	2874	24.8
Omeo (S)	Vic	459	1920	23.9
Unincorporated	SA	2944	12345	23.8
Menzies (S)	WA	69	310	22.3
Meekatharra (S)	WA	476	2173	21.9
Cairns (C)	Qld	10477	49367	21.2
Barcoo (S)	Qld	118	560	21.1
Leonora (S)	WA	610	2909	21.0
Croydon (S)	Qld	58	281	20.6
Cook (S)	Qld	1809	8792	20.6
Mount Magnet (S)	WA	235	1 162	20.2

Source: Australian Bureau of Statistics, 1991 Census (unpublished data)

FIGURE 1: PERCENTAGE VARIATION BETWEEN POPULATION COUNT AND NUMBER OF USUAL RESIDENTS: LGM, AUSTRALIA, 1991



Source; Australian Bureau of Statistics, 1991 Census (unpublished data).

TABLE 5: VARIATION IN AGE PROFILE BETWEEN CENSUS COUNTS AND USUAL RESIDENCE DATA 1991

LGA	Population	Age groups				
	measure	0-19	20-39	40-59	60+	Total
Snowy River	Census count	3912	8481	3438	1246	17077
	Usual residents	1310	2293	1172	571	5346
	Ratio	2.99	3.70	2.93	2.18	3.19
Sydney	Census count	2332	5447	3795	1902	13476
	Usual residents	908	3210	1554	1107	6779
	Ratio	2.57	1.70	2.44	1.72	1.99
Douglas	Census count	3018	4322	3040	2050	12430
	Usual residents	2176	2800	1693	746	7415
	Ratio	1.39	1.54	1.80	2.75	1.68
Diamantina	Census count	89	161	82	27	359
	Usual residents	80	100	50	12	242
	Ratio	1.11	1.61	1.64	2.25	1.48
Cue	Census count	175	438	205	49	867
	Usual residents	150	287	144	46	627
	Ratio	1.17	1.53	1.42	1.07	1.38
Shark Bay	Census count	232	445	491	434	1602
	Usual residents	167	239	217	118	741
	Ratio	1.39	1.86	2.26	3.68	2.16

Source: Australian Bureau of Statistics. 1991 Census (unpublished data)
Note: Ratios calculated as Census counts divided by usual residents

TABLE 6: VARIATION IN LABOUR FORCE STATUS BETWEEN CENSUS COUNTS AND USUAL RESIDENCE DATA, PEOPLE AGED 15 & OVER, 1991

LGA	Population measure	Labour force status (per cent)			
		Employed	Unemployed	Not in labour force	Total
Snowy River	Census count	79.7	3.9	16.4	100.0
	Usual residents	74.7	4.8	20.6	100.0
Sydney	Census count	62.2	6.6	31.1	100.0
	Usual residents	57.9	9.3	32.7	100.0
Douglas	Census count	56.2	5.8	38.0	100.0
	Usual residents	63.0	7.2	29.8	100.0
Diamantina	Census count	74.7	2.4	22.9	100.0
	Usual residents	83.6	0.0	16.4	100.0
Cue	Census count	78.5	4.6	16.9	100.0
	Usual residents	72.3	8.1	19.6	100.0
Shark Bay	Census count	51.5	4.1	44.4	100.0
	Usual residents	62.6	4.9	32.5	100.0

Source: Australian Bureau of Statistics, 1991 Census (unpublished data) Note:
Excluded people who did not indicate their labour force status

TABLE 7: VARIATION IN PERSONAL INCOME BETWEEN CENSUS COUNTS AND USUAL RESIDENCE DATA, PEOPLE AGED 15 & OVER, 1991

L G A	Population measure	Income group (per cent)			
		$0-20000	$20-50000	$50000+	Total
Snowy River	Census count	42.5	46.5	11.1	100.0
	Usual residents	58.5	37.7	3.8	100.0
Sydney	Census count	44.8	36.4	18.8	100.0
	Usual residents	56.0	36.0	8.0	100.0
Douglas	Census count	60.1	33.0	6.9	100.0
	Usual residents	67.4	30.4	2.2	100.0
Diamantina	Census count	64.7	31.5	3.8	100.0
	Usual residents	74.2	21.9	3.9	100.0
Cue	Census count	29.2	54.0	16.8	100.0
	Usual residents	4 1 . 0	46.9	12.1	100.0
Shark Bay	Census count	62.5	34.1	3.4	100.0
	Usual residents	66.5	32.2	1.3	100.0

Source: Australian Bureau of Statistics, 1991 Census (unpublished data)

TABLE 8: COMPARISON OF CENSUS-BASED MEASURES OF POPULATION

Attribute	Census count	Usual residence	Estimated resident population
Basis *of calculation*			
People counted at home	Included	Included	Included
Domestic visitors	Included at place of enumeration	Returned to place of usual residence	Returned to place of usual residence
Overseas visitors	included at place of enumeration	Excluded	Excluded
Residents temporarily overseas	Excluded	Excluded	Included at place of usual residence
Under-enumeration	No adjustment	No adjustment	Adjustment made
Availability			
Reference date	Census date	Census date	30 June
Updates	Five yearly	Five yearly	Annual
Geographic level	CD	SLA	SLA
Data available	All census data	No family, household or dwelling data	Age and sex only
Timing	First	Second	Last